

East Building, PHH-30 1200 New Jersey Avenue S.E. Washington, D.C. 20590

Pipeline and Hazardous Materials Safety Administration

DOT-SP 20343

(FOR RENEWAL, SEE 49 CFR § 107.109)

1. GRANTEE: (See individual authorization letter)

2. PURPOSE AND LIMITATION:

- a. This special permit authorizes the transportation in commerce of lithium ion battery assemblies that exceed 35 kg by cargo-only aircraft. This special permit provides no relief from the Hazardous Materials Regulations (HMR) or the International Civil Aviation Organization's Technical Instructions for the Safe Transport of Dangerous Goods by Air (ICAO TI) other than as specifically stated herein. The most recent revision supersedes all previous revisions.
- b. The safety analyses performed in the development of this special permit only considered the hazards and risks associated with the transportation in commerce.
- c. Unless otherwise stated herein, this special permit consists of the special permit authorization letter issued to the grantee together with this document.
- d. This special permit serves as an approval under Special Provision A99 of the ICAO TI and as a "Competent Authority Approval" as defined under 49 CFR § 107.1.
- 3. REGULATORY SYSTEM AFFECTED: 49 CFR Parts 106, 107 and 171- 180 and the ICAO TI.
- 4. REGULATIONS FROM WHICH EXEMPTED: 49 CFR § 172.101 Hazardous Materials Table Column (9B) in that lithium batteries may not have a mass exceeding 35 kg per package, except as specified herein.

Tracking Number: 2016096336

February 22, 2017

- 5. BASIS: This special permit is based on the application of Dr. Ing. H. c. F. Porsche AG dated September 21, 2016 submitted in accordance with § 107.105 and the public proceeding thereon.
- 6. HAZARDOUS MATERIALS (49 CFR 172.101):

Hazardous Materials Description			
Proper Shipping Name	Hazard Class/ Division	Identi- fication Number	Packing Group
Lithium ion batteries	9	UN3480	N/A

7. SAFETY CONTROL MEASURES:

a. OPERATIONAL CONTROLS -

- (1) The cells may not exceed an energy rating of 103.04 Wh.
- (2) Each module must be comprised of 13 cells and may not exceed a nominal energy rating of 1,347 Wh.
- (3) Each battery assembly may be comprised of up to eight modules. Each assembly may not exceed a nominal energy rating of $10.9~\mathrm{kWh}$ and may not exceed a mass of $140~\mathrm{kg}$.
- (4) The battery assemblies must be offered for transportation at a state of charge not exceeding 30 percent.

b. TESTING REQUIREMENTS:

(1) All lithium ion cells (identified as SDI model name CS0280R0001F in the test report dated January 14, 2013 and on file with the Office of Hazardous Materials Safety Approvals and Permits Division (OHMSAPD)) must be of a type that has passed all required tests as specified in the "UN Manual of Tests and Criteria, $5^{\rm th}$ Revised Edition."

- (2) All lithium ion modules (identified as Bosch certificate ID 0442 K 04002 or identified in the Bosch Judgment letter of UN transport test report reissue both on file with the OHMSAPD) must be of a type that has passed all required tests as specified in the "UN Manual of Tests and Criteria, 5th Revised Edition."
- (3) The battery assemblies need not be of a type that has passed the tests in the "UN Manual of Tests and Criteria, 5th Revised Edition" when each assembly has a Watt-hour rating greater than 6,200 Watt-hours and is equipped with a system capable of monitoring the battery assembly and preventing short circuits, or over discharge between the batteries in the assembly and any overheat or overcharge of the battery assembly.

c. PACKAGING REQUIREMENTS:

- (1) Outer Packaging UN 4D wooden box meeting the Packing Group II performance criteria and containing not more than one (1) battery assembly fitted inside a hard (impact resistant) outer casing; and
- (2) Battery assemblies must be protected against short circuiting and overcharging.

8. SPECIAL PROVISIONS:

- a. A person who is not a holder of this special permit who receives a package covered by this special permit may reoffer it for transportation provided no modification or change is made to the package and it is reoffered for transportation in conformance with this special permit and the HMR.
- b. A current copy of this special permit must be maintained at each facility where the package is offered or reoffered for transportation.
- c. This special permit in no way affects the need to obtain any required authorizations from other agencies of the United States Government or from the competent authorities of countries of origin, transit and destination.

- d. The grantee must maintain a record of all activity conducted under the authority granted in this special permit and upon request make this information available to DOT representatives or enforcement officials. The record must contain a listing and number of shipments made to include:
 - (1) Dates of shipment; and
 - (2) Description of each type of shipment.
- 9. MODES OF TRANSPORTATION AUTHORIZED: Cargo-only aircraft.
- 10. MODAL REQUIREMENTS: A current copy of this special permit must be carried aboard each aircraft used to transport packages covered by this special permit. The shipper must furnish a copy of this special permit to the air carrier before or at the time the shipment is tendered.
- 11. <u>COMPLIANCE</u>: Failure by a person to comply with any of the following may result in suspension or revocation of this special permit and penalties prescribed by the Federal hazardous materials transportation law, 49 U.S.C. 5101 <u>et seq</u>:
 - o All terms and conditions prescribed in this special permit and the Hazardous Materials Regulations, 49 CFR Parts 171-180.
 - o Persons operating under the terms of this special permit must comply with the security plan requirement in Subpart I of Part 172 of the HMR, when applicable.
 - o Registration required by $$107.601 \text{ } \underline{\text{et seq.}}, \text{ when applicable.}$

Each "Hazmat employee", as defined in § 171.8, who performs a function subject to this special permit must receive training on the requirements and conditions of this special permit in addition to the training required by §§ 172.700 through 172.704.

No person may use or apply this special permit, including display of its number, when this special permit has expired or is otherwise no longer in effect.

Under Title VII of the Safe, Accountable, Flexible, Efficient Transportation Equity Act: A Legacy for Users (SAFETEA-LU)—"The Hazardous Materials Safety and Security Reauthorization Act of 2005" (Pub. L. 109-59), 119 Stat. 1144 (August 10, 2005), amended the Federal hazardous materials transportation law by changing the term "exemption" to "special permit" and authorizes a special permit to be granted up to two years for new special permits and up to four years for renewals.

12. REPORTING REQUIREMENTS: Shipments or operations conducted under this special permit are subject to the Hazardous Materials Incident Reporting requirements specified in 49 CFR §§ 171.15 - Immediate notice of certain hazardous materials incidents, and 171.16 - Detailed hazardous materials incident reports. In addition, the grantee(s) of this special permit must notify the Associate Administrator for Hazardous Materials Safety, in writing, of any incident involving a package, shipment or operation conducted under terms of this special permit.

Issued in Washington, D.C.:

for William Schoonover

Associate Administrator for Hazardous Materials Safety

Address all inquiries to: Associate Administrator for Hazardous Materials Safety, Pipeline and Hazardous Material Safety Administration, U.S. Department of Transportation, East Building PHH-30, 1200 New Jersey Avenue, Southeast, Washington, D.C. 20590.

Copies of this special permit may be obtained by accessing the Hazardous Materials Safety Homepage at http://hazmat.dot.gov/sp app/special permits/spec perm index.htm. Photo reproductions and legible reductions of this special permit are permitted. Any alteration of this special permit is prohibited.

PO: KLEM